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INFORMATION DISCLOSURE STATEMENT per 37 C.F.R. 1.97 & 1.98

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Re: Patent Application Number 09/148,806

Filed 09/04/98

GRP ART UNIT 2735

Inventors/Applicants: Brad A. Armstrong

Title: REMOTE CONTROLLER WITH ANALOG BUTTON(S)

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REMARKS

Dear Sir:

Please associate this document/paper with patent application 09/148,806.

This Information Disclosure Statement per 37 CFR 1.97 and 1.98 is being filed prior to the mailing of the first examination or Office Action on the merits of my application 09/148,806, and therefore no fee payment is believed required.

I wish to inform the Examiner that in addition to that prior art specifically detailed in my originally filed application, namely U.S. Patents 3,806,471; 4,315,238; 4,866,542 full copies of which were included in the original application filing, I am also aware of one or more models of pointer control devices in the form of hand supported computer control devices, sometimes referred to as remote control mice or remote mice, and apparently made by Interlink Electronics, Inc. of Camarillo, CA, USA. and for sale at least on the Internet site of <http://www.cdw.com> at least in Sept. 1998. See attached two sheets printed from cdw

site in Sept. 1998 describing a 2-button remote mouse titled RemotePoint remote-control mouse, and the other sheet describing a cordless, hand-held mouse having the same title as the 2-button above mentioned mouse, and both made by Interlink Electronics. These two computer mouse devices by Interlink are believed to include pressure sensitive buttons for analog output to allow variable speed control of a cursor or pointer of a computer. These pointing devices for computers by Interlink Electronics are considered relevant to the present invention, but are not considered material to patentability because they do not operate televisions, cable boxes, satellite boxes, VCRs, DVDs and like accessories associated with televisions. Furthermore the computer mouse devices of Interlink do not effect function-controls such as channel selection/tuning and with variable speed thereof, nor are they associated with video speed controls. Additionally, the computer mouse devices by Interlink are not associated with video guide controls such as are commonly used in satellite TV systems such as DSS, Primestar, DISH TV, and set-top boxes such as REPLAY TV and TIVO and the like. The computer mouse devices of Interlink are not anticipated to be useful in or with function-controls related to channel tuning and or video speed control as taught in the instant application.

I have a related co-pending U.S. non-provisional patent application titled "GAME CONTROLLER WITH ANALOG PRESSURE SENSOR(S)" filed Oct. 1, 1997, serial number 08/942,450, and which claims the benefit of a Provisional application of the same title filed Sept. 17, 1997, serial number 60/059,125. The sensors of the related applications are variable-conductance sensors which are incorporated in a two handed remote game controller host device. I am not at this time claiming the priority of the earlier filing date of my application 08/942,450 for the instant application.

I also have another co-pending U.S. non-provisional patent application titled VARIABLE-CONDUCTANCE SENSOR filed June 29,

1998, serial number 09/106,825. I am not at this time claiming the priority of the earlier filing date of my application 09/106,825 for the instant application.

I also have yet another co-pending U.S. non-provisional patent application titled VARIABLE-CONDUCTANCE SENSOR WITH ELASTOMERIC DOME-CAP application No. 09/122,269, filed July 24, 1998, art unit 2832. I am not at this time claiming the priority of the earlier filing date of this earlier application of mine for the instant application.

I also have still another co-pending U.S. non-provisional patent application titled COMPUTER MOUSE WITH ANALOG BUTTONS, application No. 09/167,314 which was filed 10/06/98.

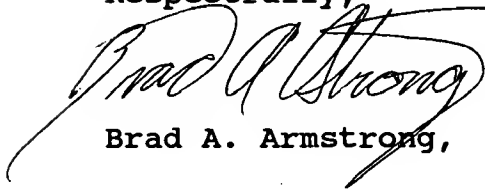
At any time when the Patent Examiner believes the claiming of the benefit of the earlier filing date of any of the above applications for the instant application would be helpful in advancing the instant application toward allowance, the forwarding of such information to applicant would be appreciated.

I believe the present claimed invention is patentable over the prior art specifically addressed in the instant application. I also believe the present invention is patentable over the inventions of my above mentioned co-pending applications, but wish the issues pertaining to Double Patenting be carefully considered by the PTO Examiners, as I want everything to be proper when my applications issue as U.S. Patents. Thank you for your consideration and assistance.

I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may

jeopardize the validity of the application or any patent issued thereon.

Respectfully,



Date: June 17, 1999

Brad A. Armstrong, Inventor / Applicant

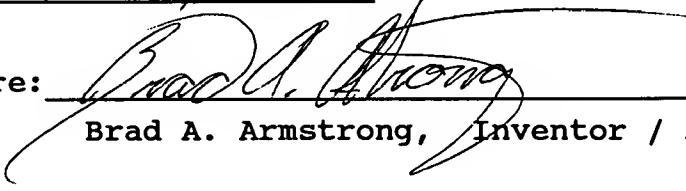
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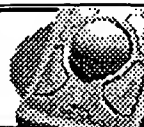
I hereby certify that the herewith included/attached Information Disclosure Statement is being deposited with the United States Postal Service as EXPRESS mail article #EJ385600902US, with sufficient postage pre-paid in an envelope addressed to: Commissioner of Patents and Trademarks, Washington, D. C. 20231,

on this date: June 17, 1999.

Signature: \_\_\_\_\_



Brad A. Armstrong, Inventor / Applicant

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Wherever you roam, you're in command with the RemotePoint remote-control mouse. For complete freedom, RemotePoint is the superior hand-held mouse for PC and Macintosh applications. This cordless, infrared pointing device operates at distances of up to 40 feet, so you can interactively present, work, play or learn in unrestricted comfort. RemotePoint has immediate appeal. Its elegant ergonomics deliver the ultimate in hand-held comfort. Pick it up, roll your thumb around the soft rubber pointing button and experience seamless 360-degree cursor control. Responding to variable thumb pressure, the cursor moves smoothly in any direction at speeds ranging from a precise crawl to a screen-crossing zip. RemotePoint's trigger-like mouse click button is a joy to use.

## Keyboard and mouse options

- Connection: Serial or PS/2
- Mouse type: Mouse
- Number of buttons: 2-button
- Scrolling device: Software controlled
- Ergonomic? Yes
- Wireless? Yes

## Software

- SlideWorks Software

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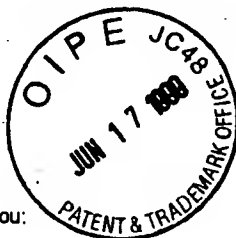
**INTERLINK ELECTRONICS****RemotePoint remote-control mouse**

2-button remote mouse

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<b>\$97.44</b>	<b>In Stock</b>	<b>65755</b>	<b>INE-VP4500</b>

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**Software**

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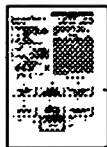
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## 4866542 : Remote-controlling commander with multi-function rotary dial

This patent was reissued on Oct. 1, 1996 as patent [RE35343](#)

INVENTORS: **Shimada; Keiichiro**, Kanagawa, Japan

**Wakahara; Tatsuya**, Tokyo, Japan

**Shibuya; Noboru**, Kanagawa, Japan

ASSIGNEES: **Sony Corporation**, Tokyo, Japan

ISSUED: **Sep. 12, 1989** FILED: **Dec. 17, 1986**

SERIAL NUMBER: **942978** MAINT. STATUS:

INTL. CLASS  
(Ed. 4): **H04N 005/783**;

U.S. CLASS: **360/010.3**; 360/033.1; 360/071; 360/073.08; 358/335;

FIELD OF  
SEARCH: **369-7;6** ; **358-335,191.1,194.1** ; **360-33.1,10.1,14.1,61,10.3,71,73,73.01,73.04,73.05,73.08** ;  
**455-181,186,185,179,603** ; **361-340** ; **200-33 R,61,58 R** ; **340-696,688,870.08** ;

**ABSTRACT:** A remote-controlling commander includes a rotary dial rotatably mounted on a commander housing for manual operation of the user. The commander also includes a position detector for monitoring angular position of the rotary dial, in which the angular position and/or angular displacement of the rotary dial represents which operation of the apparatus is to be controlled and an encoder for producing an encoded signal variable depending upon the angular position and/or angular displacement of the rotary dial. The encoded signal is transmitted through a transmitter to a receiver provided in the apparatus to be controlled. The received signal is decoded in the apparatus to trigger the function represented by the received signal. The received signal from the remote-controlling commander may be used to perform functions associated with a VTR, such as timing of video recording, picture searching, channel timing, and the like.

U.S. REFERENCES: [Show the 17 patents that reference this one](#)

Patent	Inventor	Issued	Title
3987414	Tuma	10 /1976	Digital remote control for electronic signal receivers
4045777	Mierzwinski et al.	8 /1977	Remote control transmitter and receiver for use with a television receiver
4081754	Jackson	3 /1978	Programmable television receiver controllers
4206483	Nakamura	6 /1980	Automatic checking device for preset recording program of recording and reproducing apparatus
4270117	Ziegelbein et al.	5 /1981	Variable rate digital controller for a frequency synthesizer
4325081	Abe et al.	4 /1985	Programmed timer for VTR
4352010	Koogler	9 /1982	Variable rate tuning for radio transmitters and receivers
4404531	Genrich	9 /1983	Frequency scanning apparatus wherein a single knob controls both step size and direction of change
4428005	Kubo	1 /1984	Mode selecting device for a video signal reproducing apparatus
4527204	Kozakai et al.	7 /1985	Remote control system
4538188	Barker et al.	4 /1985	Video composition method and apparatus
4539603	Takeuchi et al.	4 /1985	Video signal reproducing device
4539711	Harger	9 /1985	Tuning control system for a pair of tuners employing a common channel skip memory
4712105	Kohler	12 /1987	Remote control hand apparatus for operating different modules
4718112	Shinoda	1 /1988	Remote control apparatus
4786982	Wakahara et al.	11 /1988	Multi-function rotary dial system including timer setting feature

EXEMPLARY CLAIM(s): Show all 22 claims

What is claimed is:

1. A system for remotely controlling a video tape recorder which performs different functions including a timer activated recording function as a first function, and second function, comprising;

- a controller provided in said video tape recorder for controlling operation of said video tape recorder and selecting operation modes for accomplishing different functions to according to a control command;
- first means, incorporated in said apparatus and associated with said controller for performing said first function;
- second means, incorporated in said apparatus and associated with said controller for performing said second function;
- a remote control commander including a push button for selecting operation modes of said apparatus and producing a remote control signal carrying said control command, a rotary dial assembly operable for generating said control command for operating said first and second means selectively for performing said first and second functions;
- a mode selector switch for selecting an operation mode of said remote control commander at least among a first position, at which said control command generated by said remote control commander operates said first means for performing said first function, and a second position, at which said control command generated by said remote control command operates said second means for performing said second function; said rotary dial assembly comprising:
  - a dial manually rotatable at a desired speed in opposing first and second directions;
  - a first sensing means for monitoring magnitude of angular displacement of said dial and producing a rotation angle indicative signal;
  - a timer set mode switch manually operable to produce a timer set mode selector signal ordering said video tape recorder system to operate in a timer set mode;
  - a display for displaying at least symbols representing a timer-activated recording start timing and end timing; and



Remote-controlling of remotes with multi-function rotary dial (4866512) <http://www.patents.ibm.com/details?patent-number=4866512&language=en>  
controller responsive to said timer set mode selector signal for changing the value represented by each of said symbols at a given rate on said display, said given rate being selected on the basis of the values of said direction indicative signal and said rotating angle indicative signal.

RELATED U.S. APPLICATIONS: **none**

FOREIGN APPLICATION PRIORITY DATA:

Application No.	Country	Date
60-295292	Japan	Dec. 27, 1985

FOREIGN REFERENCES:

Document No.	Country	Date	Intl. Class
0002434	EPO	9 /1978	
0188162	EPO	7 /1986	
2491707	France	9 /1982	
WO81/03713	WIPO	12 /1981	
2006559	United Kingdom	5 /1979	

OTHER REFERENCES: **none**

ATTORNEY, AGENT, or FIRM: **Kananen; Ronald P.;**  
PRIMARY/ASSISTANT EXAMINERS: **Faber; Alan;** Young; W. R.

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